

## EAST Search History

| Ref # | Hits    | Search Query   | DBs                | Default Operator | Plurals | Time Stamp       |
|-------|---------|--|--------------------|------------------|---------|------------------|
| S8    | 275455  | (cathode positive near3 electrode)   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 07:59 |
| S9    | 1623810 | solution solute dissolv\$5   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 08:58 |
| S10   | 65553   | (mn manganese ni nickel co cobalt) near3 (oxide carbonate)   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 11:54 |
| S11   | 70154   | (aqueouds solut\$6) with salt near3 (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt ni nickel cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 08:12 |
| S12   | 79487   | (aqueous solut\$6) with salt near3 (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt ni nickel cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum)  | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 08:12 |
| S13   | 31      | S8 and S9 with S10 same S12 with (precipitat\$5 bond\$4)   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 10:01 |
| S14   | 179344  | (solution solute dissolv\$5) with (alkaline carbonate hydrogencarbonate hydrocarbonate)  | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 08:59 |
| S15   | 1704    | S10 with S14   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 08:59 |
| S16   | 142     | S10 with S14 same (precipitat\$3 with metal)   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 08:59 |
| S17   | 138     | S16 not S13  | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 09:00 |
| S18   | 16      | S17 and S8   | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 09:00 |
| S19   | 138     | S9 with S10 same S12 with (precipitat\$5 bond\$4) not S13  | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 11:54 |
| S20   | 113     | S10 same (lithium li) near3 (hydro\$4 near3 carbonate) same (cobalt so) near3 (sulfate salt carbonate drip)  | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 11:57 |
| S21   | 112     | S20 not S13  | US-PGPUB;<br>USPAT | OR               | ON      | 2007/03/12 11:56 |

## EAST Search History

|     |        |  |                        |    |    |                  |
|-----|--------|--|------------------------|----|----|------------------|
| S22 | 9      | S10 same (lithium li) near3 (hydro\$4 near3 carbonate) same (cobalt so) near3 (sulfate salt carbonate drip) same (solution solute precipitat\$3)                                 | US-PGPUB; USPAT        | OR | ON | 2007/03/12 11:57 |
| S23 | 1      | ("6241959").PN. OR ("6334992").URPN.   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 12:03 |
| S24 | 11     | ("5478674"   "5498403"   "5587139"   "5626635"   "5635313"   "5674643"   "5993998"   "6013390"   "6040090").PN. OR ("6241959").URPN.   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 12:04 |
| S25 | 33     | ("4302518"   "5135732"   "5370948"   "5490320").PN. OR ("5626635").URPN.   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:34 |
| S26 | 33     | S25 and (solution process method precipitat\$5 bond\$4)  | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:35 |
| S27 | 18     | S25 and (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) with (process method)   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:42 |
| S28 | 11     | ("5478674"   "5498403"   "5587139"   "5626635"   "5635313"   "5674643"   "5993998"   "6013390"   "6040090").PN. OR ("6241959").URPN.   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:41 |
| S29 | 8      | S28 and (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) with (process method) not S27   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:48 |
| S30 | 275455 | (cathode positive near3 electrode)   | US-PGPUB; USPAT        | OR | ON | 2007/03/12 14:50 |
| S31 | 3943   | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (process method) same (alkaline carbonate hydrogencarbonate) near3 solution and S30                                    | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:50 |
| S32 | 819    | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (process method) same (alkaline carbonate hydrogencarbonate) near3 solution same S30                                   | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:51 |
| S33 | 2      | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (process method) same (alkaline carbonate hydrogencarbonate) near3 solution same S30 same (drip\$4 with precipitat\$5) | US-PGPUB; USPAT; USOCR | OR | ON | 2007/03/12 14:51 |

## EAST Search History

|     |      |  |                              |    |    |                  |
|-----|------|--|------------------------------|----|----|------------------|
| S34 | 17   | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (process method) same (alkaline carbonate hydrogencarbonate) near3 solut\$4 same (drip\$4 with precipitat\$5)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/12 14:53 |
| S35 | 78   | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (process method) same (alkaline carbonate hydrogencarbonate) near3 solut\$4 same (drip\$4 titrat\$5) with precipitat\$5  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/12 15:06 |
| S36 | 61   | S35 not S34  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/12 14:54 |
| S37 | 456  | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (alkaline carbonate hydrogencarbonate) near3 solut\$4 and (drip\$4 titrat\$5) with precipitat\$5   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/12 15:07 |
| S38 | 41   | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (alkaline carbonate hydrogencarbonate) near3 solut\$4 same (nickel ni cobalt co manganese mn) and (drip\$4 titrat\$5) with precipitat\$5                                 | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/12 15:09 |
| S39 | 41   | (solution precipitat\$5 bond\$4 dissolv\$4 solut\$4) same (alkaline carbonate hydrogen adj carbonate) near3 solut\$4 same (nickel ni cobalt co manganese mn) and (drip\$4 titrat\$5) with precipitat\$5                            | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/12 15:29 |
| S40 | 4    | ("20020122767" "6080510" "62729 26" "6325988").PN.   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/12 15:29 |
| S41 | 12   | (US-20050265909-\$ or US-20030022063-\$ or US-20030129495-\$).did. or (US-6660432-\$ or US-6040090-\$ or US-6241959-\$ or US-5626635-\$ or US-6334992-\$ or US-6242134-\$ or US-6132639-\$ or US-4101716-\$ or US-6210834-\$).did. | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 09:50 |
| S42 | 8    | S41 and alkali\$5 near5 solution   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 12:10 |
| S43 | 1110 | alkali\$5 near5 solution same (ni nickel mg manganese co cobalt) near5 (oxide carbonate)   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 13:03 |
| S44 | 396  | alkali\$5 near5 solution same (ni nickel mg manganese co cobalt) near5 (oxide carbonate) and (cathode positive near3 electrode)  | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 13:12 |

## EAST Search History

|     |     |  |                              |    |    |                  |
|-----|-----|--|------------------------------|----|----|------------------|
| S45 | 215 | alkali\$5 near5 solution same (ni nickel mg manganese co cobalt) near5 (oxide carbonate) and (lithium li) and (cathode positive near3 electrode)   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 13:20 |
| S46 | 0   | (11/588463).APP.   | USPAT;<br>USOCR              | OR | ON | 2007/03/14 13:13 |
| S47 | 60  | alkali\$5 near5 solution same (ni nickel mg manganese co cobalt) near5 (oxide carbonate) same (precipitat\$6 bond\$6) and (cathode positive near3 electrode)   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 13:21 |
| S48 | 22  | ("5198081"   "5429890"   "5449577"   "5478672"   "5641468"   "5744266"   "5807646"   "5866279"   "5869208"   "5874058"   "5882821"   "5928714"   "5948565"   "5961950"   "6103419"   "6110442"   "6117410"   "6123911"   "6168888"   "6242134"   "6416902").PN. OR ("6551571").URPN.   | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:13 |
| S49 | 214 | (nickel ni manganese mn cobalt co) near3 (oxide carbonate) with (precipitat\$5 bond\$4) near4 (surface outside)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:16 |
| S50 | 167 | (nickel ni manganese mn cobalt co) near3 (oxide carbonate) with (precipitat\$5 bond\$4) near4 (surface outside) near6 (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt ni nickel cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:45 |
| S51 | 69  | S49 and (cathode electrode near3 positive)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:19 |
| S52 | 12  | (US-20050265909-\$ or US-20030022063-\$ or US-20030129495-\$ or US-20020197202-\$).did. or (US-6660432-\$ or US-6040090-\$ or US-5626635-\$ or US-6334992-\$ or US-6242134-\$ or US-6132639-\$ or US-4101716-\$ or US-6210834-\$).did.   | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 14:33 |

## EAST Search History

|     |      |   |                              |    |    |                  |
|-----|------|---|------------------------------|----|----|------------------|
| S53 | 9    | S52 and (cobalt with (salt sulf\$4))  | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 14:36 |
| S54 | 0    | "20020197202".pn. and (mn manganese) near5 (co cobalt) with (ratio to)  | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 14:37 |
| S55 | 1    | "20020197202".pn. and (mn manganese) with (co cobalt) with (ratio to amount)  | US-PGPUB;<br>USPAT           | OR | ON | 2007/03/14 14:38 |
| S56 | 146  | (nickel ni cobalt co) near3 (oxide carbonate) with (precipitat\$5 bond\$4) near4 (surface outside) near6 (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt ni nickel cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:50 |
| S57 | 53   | (nickel ni cobalt co) near3 (oxide carbonate lithium li) with (precipitat\$5 bond\$4) near4 (surface outside) near6 (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt ni nickel cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) and (cathode positive adj electrode) | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:56 |
| S58 | 7198 | (cobalt co) near6 (oxide carbonate (lithium li) near3 oxide) with (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron ni nickel cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) and (cathode positive adj electrode)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:57 |

## EAST Search History

|     |      |  |                              |    |    |                  |
|-----|------|--|------------------------------|----|----|------------------|
| S59 | 9431 | (nickel ni) near6 (oxide carbonate (lithium li) near3 oxide) with (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) and (cathode positive adj electrode)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:58 |
| S60 | 4403 | (nickel ni) near6 (oxide carbonate (lithium li) near3 oxide) with (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) same (cathode positive adj electrode) | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 14:59 |
| S61 | 2689 | (nickel ni) near6 (oxide carbonate (lithium li) near3 oxide) with (sc scandium ti titanium v vanadium cr chromium mn manganese fe iron co cobalt cu copper li lithium na sodium k potassium rb rubidium cs cesium fr francium be beryllium mg magnesium ca calcium sr strontium ba barium ra radium b boron al aluminum) with (cathode positive adj electrode) | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 15:00 |
| S62 | 1951 | (nickel ni) near6 (oxide carbonate (lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) with (cathode positive adj electrode)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 15:02 |
| S63 | 1649 | S62 and ("423"/\$.ccls. "429"/\$.ccls. 29/23.1-623.5.ccls.)  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 15:01 |
| S64 | 933  | (nickel ni) near6 ((lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) with (cathode positive adj electrode)   | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 15:02 |
| S65 | 552  | (nickel ni) near6 ((lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) with (cathode positive adj electrode) with active near2 material  | US-PGPUB;<br>USPAT;<br>USOCR | OR | ON | 2007/03/14 15:03 |

## EAST Search History

|     |     |   |                    |    |    |                  |
|-----|-----|---|--------------------|----|----|------------------|
| S66 | 552 | (nickel ni) near6 ((lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) with (cathode positive adj electrode) with active near2 material                         | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:04 |
| S67 | 4   | (nickel ni) near6 ((lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) near3 (dop\$4 additive) with (cathode positive adj electrode) with active near2 material | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:05 |
| S68 | 24  | (nickel ni) near6 ((lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) near3 (dop\$4 additive) and (cathode positive adj electrode)                             | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:04 |
| S69 | 24  | (nickel ni) near6 ((lithium li) near3 oxide) with (co cobalt mn manganese al aluminum) near3 (dop\$4 additive) and (cathode positive adj electrode)                             | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:10 |
| S70 | 21  | (co cobalt) near6 ((lithium li) near3 oxide) with (nickel ni mn manganese al aluminum) near3 (dop\$4 additive) and (cathode positive adj electrode) not S69                     | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:32 |
| S71 | 2   | lithium near3 cobaltate with (nickel ni mn manganese al aluminum) near3 (dop\$4 additive) and (cathode positive adj electrode) not S69  | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:34 |
| S72 | 21  | lithium near3 cobalt near3 oxide with (nickel ni mn manganese al aluminum) near3 (dop\$4 additive) and (cathode positive adj electrode) not S70                                 | US-PGPUB;<br>USPAT | OR | ON | 2007/03/14 15:34 |